No. of Printed Pages : 3 **MGYL–012(Set-II)**

M. SC. (GEOINFORMATICS)

(MSCGI)

Term-End Practical Examination

June, 2025

MGYL-012(Set-II) : ADVANCED GEOINFORMATICS LABORATORY

Time : 3 Hours *Maximum Marks : 30*

Note : *(i) All questions are compulsory. Marks are indicated against each question.*

(ii) Evaluation would be done under three parameters (i.e., performance, results/outputs and viva-voce).

(iii) The data to be used in the examination are either provided by the examination centres in the computer allotted to you or can be downloaded/used using internet specifically for the questions related to GEE, etc.

(iv) The data provided in the computers are in the folder, named as A, B, C, ... which are mentioned in the question paper as (A), (B), (C), ... , respectively.

(v) Keep all the soft copy results/outputs appropriately in the computer in a folder with your enrollment number. Other answers are to be written in the answer-sheet provided to you.

(vi) Incomplete and illegible results/ outputs will not be evaluated.

1. (a) Create NDVI over the past decade for Delhi region using Google Earth Engine. Analyse the result and write your interpretation in the answer-sheet.

6+3

[**Hint** : You can use seasonal or annual NDVI data].

(b) Create a False Colour Composite (FCC) from the given dataset (B) and classify the FCC using Python to generate a landuse land cover map having at least 4 classes. 1+4

(c) Publish a raster dataset in GeoServer and make it available as a Web Map Service (WMS). Write the major steps in your answer-sheet. 3+2

[**Hint** : You can use the data in the folder (A) and/or (B) and the outputs generated at 1a and/or b].

(d) Write the steps for inserting geospatial data into Post-GIS-enabled table. 3

[**Hint** : For example, you can insert coordinates for major landmarks in a city].

(e) Write the steps for adding a Web Map Service (WMS) layer to your open layers map. 3

2. Viva-voce. 5

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